

**OPTIMIZATION OF A DEDICATED HIGH FREQUENCY POWER TRANSFORMER
FOR AN ISOLATED 10kW BATTERY CHARGER FOR INDUSTRIAL USE, BY
MEANS OF ELECTROMAGNETICAL SIMULATION**

ABSTRACT - In high frequency converters for industrial use, the efficiency is one of the most important feature to consider. In case of isolated converters, power transformer's losses are typically the distinguishing element while choosing the final solution. This paper analyzes the minimization of transformer's power losses, by evaluating the results of the electromagnetical simulations with different internal constructions.